

## **“Fishmaster” Concept Maximizing Environmental Water Benefits Of the Bay Delta Conservation Plan**

*A Dual Conveyance system will dramatically expand real-time water management options compared to the present system. There will be ongoing choices to make among a half a dozen points of diversion, the timing of those diversions and the pumping rates. The question is who will be making those real-time decisions. The following “Fishmaster” concept would delegate those decisions to a representative of the existing state and federal wildlife agencies. The single goal of the Fishmaster would be to maximize the protection of fish species within the operational parameters of BDCP for each of these Delta locations.*

The BDCP will establish a range of operating criteria, which could be either narrow or wide, with a specific set of “expected conditions” within this range from which export water supply assurances will be based. These operating criteria will vary according to water year type and other conditions. The operating criteria will be established to achieve the goals of the conservation plan and will be subject to compliance with the permits.

These permits will prescribe limits on take of listed species and protection of critical habitat. These permits will impose constraints and criteria on the operations of the export facilities, such as Hood bypass flow requirements, delta outflow requirements, Old and Middle flow conditions, etc, deemed necessary to protect and conserve the species while meeting water supply goals. All the BDCP signatory agencies will encourage that the State Water Board Bay Delta Water Quality Control Plan and water rights’ permits of the CVP and SWP in the Delta be consistent with the BDCP. Within these regulatory constraints, considerable operational discretion will remain regarding three variables for points of diversion: (1) location, (2) rate, (3) timing of diversions. These are the real time operational decisions. How these decisions are made will affect both the extent to which the water supply goals are met and progress toward recovery of the species.

Optimal real time operations will maximally reduce conflict between those goals. Actual operations will vary based on real time fishery needs within the operational range pursuant to the criteria established by the BDCP. The “expected operational conditions” will allow the calculation of the water supply goals that will be guaranteed to the PREs

over some accounting period (annual or running average annual). But the rate of exports at each diversion point will be under the control of an entity that will be designated to make operational decisions to reduce impacts on fish. When that entity exercises its power to increase fishery protections from the expected conditions and thus reduce allowable exports, that will create a water supply credit. Conversely, its decisions to allow liberal exports in the near term will create credits for fish protection that can be used later.

Implicitly, there is a credit and debit involved in this process due to routine decision making, but no formal trading arrangement is necessary.

The Adaptive Management Process will be used to review the effectiveness of the range for each of the key parameters for which the above process will be used. The AMP will also be used to establish values/ranges for key parameters that are within the discretion of the Implementing Entity.

Annually, or as needed, the non-routine decision making process through the AMP may adjust the range within the permit subject to real time operations.